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(FILE 'HOME' ENTERED AT 10:59:06 ON 03 MAR 2003)

FILE 'REGISTRY' ENTERED AT 11:00:37 ON 03 MAR 2003

L1 49622 S 5<SQL<21 AND (CYCL? OR BRIDGE)/NTE
L2 40221 S L1 NOT TERMINAL/NTE
L3 35963 S L2 NOT CYS-1/NTE

=> d sqd,bib 30000,30010,30020, 30100,30200,30300,
30400,30500,30600,30700,30800,30900, 31000,32000,33000,34000,35000

L3 ANSWER 30000 OF 35963 REGISTRY COPYRIGHT 2003 ACS
RN 112599-12-9 REGISTRY
FS PROTEIN SEQUENCE
SQL 10,5,5
NTE multichain
modified (modifications unspecified)

type	location	description
bridge	Thr-1 - Thr-1'	covalent bridge, dimer
bridge	Thr-1 - Val-5	lactone
bridge	Thr-1' - Val-5'	lactone
uncommon	Sar-4 -	-
uncommon	Sar-4' -	-
stereo	Val-2 -	D
stereo	Val-2' -	D

SEQ 1 TVPXV

SEQ 1 TVPXV

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 108:150968 CA
TI Synthesis and biological properties of actinomycin D chromophoric analogs substituted at carbon 7 with aziridine and cyclopropyl functions
AU Sehgal, Raj K.; Almassian, Bijan; Rosenbaum, David P.; Zadrozny, Ruth; Sengupta, Sisir K.
CS Sch. Med., Boston Univ., Boston, MA, 02118, USA
SO Journal of Medicinal Chemistry (1988), 31(4), 790-3
CODEN: JMCMAR; ISSN: 0022-2623
DT Journal
LA English

L3 ANSWER 30010 OF 35963 REGISTRY COPYRIGHT 2003 ACS
RN 112506-30-6 REGISTRY
FS PROTEIN SEQUENCE; STEREOSEARCH
SQL 9
NTE modified (modifications unspecified)

type	location	description
bridge	Asp-5 - Dpr-9	lactam
uncommon	Dpr-9 -	-
stereo	Ala-1 -	D
stereo	Phe-2 -	D
stereo	Trp-3 -	D
stereo	Arg-6 -	D

SEQ 1 AFWSDRLRX

REFERENCE 1

AN 108:94935 CA
 TI Design of potent cyclic gonadotropin releasing hormone antagonists
 AU Rivier, J.; Kupryszewski, G.; Varga, J.; Porter, J.; Rivier, C.; Perrin, M.; Hagler, A.; Struthers, S.; Corrigan, A.; Vale, W.
 CS Salk Inst., Clayton Found. Lab. Pept. Biol., La Jolla, CA, 92037, USA
 SO Journal of Medicinal Chemistry (1988), 31(3), 677-82
 CODEN: JMCMAR; ISSN: 0022-2623
 DT Journal
 LA English

L3 ANSWER 30020 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 112501-31-2 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 8,4,4
 NTE multichain
 modified (modifications unspecified)

type	location	description
bridge	Cys-3 - Cys-3'	disulfide bridge, dimer

SEQ 1 EDCK

SEQ 1 EDCK

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 109:73924 CA
 TI Preparation of cysteine-containing peptide dimers as hemopoiesis stimulants
 IN Laerum, Ole Didrik
 PA Nycomed A/S, Norway
 SO Eur. Pat. Appl., 15 pp.
 CODEN: EPXXDW
 DT Patent
 LA English
 FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	EP 267741	A1	19880518	EP 1987-309806	19871105
	EP 267741	B1	19920624		
	R: ES, GR				
	WO 8803535	A1	19880519	WO 1987-GB784	19871105
	W: AU, DK, FI, GB, JP, NO, US				
	RW: AT, BE, CH, DE, FR, GB, IT, LU, NL, SE				
	AU 8781747	A1	19880601	AU 1987-81747	19871105
	AU 604279	B2	19901213		
	EP 330667	A1	19890906	EP 1987-907244	19871105
	R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
	JP 02500517	T2	19900222	JP 1987-506666	19871105
	AT 77628	E	19920715	AT 1987-309806	19871105
	ES 2038675	T3	19930801	ES 1987-309806	19871105
	CA 1337407	A1	19951024	CA 1987-551089	19871105
	ZA 8708349	A	19880727	ZA 1987-8349	19871106
	US 4987122	A	19910122	US 1988-206341	19880617
	DK 8803698	A	19880704	DK 1988-3698	19880704
	DK 171992	B1	19970908		
	NO 8803008	A	19880705	NO 1988-3008	19880705

NO 164479 B 19900702
 NO 164479 C 19901010
 FI 8902185 A 19890505 FI 1989-2185 19890505
 FI 92209 B 19940630
 FI 92209 C 19941010
 PRAI GB 1986-26539 19861106
 EP 1987-309806 19871105
 WO 1987-GB784 19871105

REFERENCE 2

AN 108:49956 CA
 TI Hemoregulatory peptide synthesis, purification of tritium labeled peptide and uptake of peptide in hematopoietic tissues in vitro
 AU Eriksen, Jon Amud; Schanche, Jon Sverre; Hestdal, Kjetil; Jakobsen, Sten Eirik; Tveteraas, Trygve; Johansen, Jon Henrik; Paukovits, Walter R.; Laerum, Ole D.
 CS Nycomed, Oslo, N-0401, Norway
 SO Colloque INSERM (1987), 162 (Inhib. Hematopoiesis), 51-4
 CODEN: CINMDE; ISSN: 0768-3154
 DT Journal
 LA English
 L3 ANSWER 30100 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 111982-70-8 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 7
 NTE **cyclic**
 modified (modifications unspecified)

type	location			description
uncommon	Bas-4	-	-	
uncommon	Oaa-6	-	-	
uncommon	Ggu-7	-	-	
stereo	Ala-2	-	D	
stereo	Bas-4	-	D	
stereo	Ggu-7	-	D	

SEQ 1 AAFXRXX

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 138:28657 CA
 TI Fate of microcystin in Lake Suwa
 AU Park, Ho-Dong; Yokoyama, Atsushi; Okino, Tokio
 CS Department of Environmental Sciences, Faculty of Science, Shinshu University, Matsumoto, 390-8621, Japan
 SO Rikusuigaku Zasshi (2001), 62(3), 229-248
 CODEN: RIZAAU; ISSN: 0021-5104
 PB Nippon Rikusu Gakkai
 DT Journal
 LA Japanese

REFERENCE 2

AN 134:2389 CA
 TI Isolation and identification of seven microcystins from a cultured M.TN-2 strain of Microcystis aeruginosa
 AU Lee, Tzong-Huei; Chou, Hong-Nong
 CS Institute of Botany, Academia Sinica, Taipei, 11529, Taiwan

SO Botanical Bulletin of Academia Sinica (2000), 41(3), 197-202
CODEN: BBASA6; ISSN: 0006-8063
PB Academia Sinica, Institute of Botany
DT Journal
LA English
RE.CNT 41 THERE ARE 41 CITED REFERENCES AVAILABLE FOR THIS RECORD
ALL CITATIONS AVAILABLE IN THE RE FORMAT

REFERENCE 3

AN 129:99599 CA
TI First identification of microcystins in Irish lakes aided by a new
derivatization procedure for electrospray mass spectrometric analysis
AU Sherlock, Ian R.; James, Kevin J.; Caudwell, F. Barry; Mackintosh, Carol
CS Ecotoxicology Research Unit, Chemistry Department, Cork Institute of
Technology, Cork, Ire.
SO Natural Toxins (1998), Volume Date 1997, 5(6), 247-254
CODEN: NATOEE; ISSN: 1056-9014
PB Wiley-Liss, Inc.
DT Journal
LA English
RE.CNT 29 THERE ARE 29 CITED REFERENCES AVAILABLE FOR THIS RECORD
ALL CITATIONS AVAILABLE IN THE RE FORMAT

REFERENCE 4

AN 126:208385 CA
TI Seven microcystins from Microcystis water bloom in Lake Dalai, China
AU He, Zhenrong; He, Jiawan; Yu, Minjuan; Qiao, Mingye; Shen, Zhi; Wu,
Liandi; Wu, Suozhu; Guo, Yunfeng; Kondo, Fumio; Harada, Ken-Ichi
CS Institute of Hydrobiology, Chinese Academy of Sciences, Wuhan, 430072,
Peop. Rep. China
SO Journal of Environmental Sciences (China) (1997), 9(1), 113-119
CODEN: JENSEE; ISSN: 1001-0742
PB Science Press
DT Journal
LA English

REFERENCE 5

AN 125:338125 CA
TI Cyanobacterial toxins in water
AU Sadler, Ross
CS Government Chem. Lab., Coopers Plains, Australia
SO Proceedings of International Seminar on Water and Environment, Katmandu,
Nepal, Mar. 30-Apr. 1, 1994 (1994), 88-99. Editor(s): Chitrakar, Ramesh.
Publisher: Nepal Chemical Society, Katmandu, Nepal.
CODEN: 63KXAC
DT Conference; General Review
LA English

REFERENCE 6

AN 123:314518 CA
TI Seven More Microcystins from Homer Lake Cells: Application of the General
Method for Structure Assignment of Peptides Containing
.alpha.,.beta.-Dehydroamino Acid Unit(s)
AU Namikoshi, Michio; Sun, Furong; Choi, Byoung Wook; Rinehart, Kenneth L.;
Carmichael, Wayne W.; Evans, William R.; Beasley, Val R.
CS Roger Adams Laboratory, University of Illinois, Urbana, IL, 61801, USA
SO Journal of Organic Chemistry (1995), 60(12), 3671-9
CODEN: JOCEAH; ISSN: 0022-3263
PB American Chemical Society
DT Journal

LA English

REFERENCE 7

AN 119:110937 CA
TI Structural modifications imparting reduced toxicity in microcystins from *Microcystis* spp.
AU Stotts, Richard R.; Namikoshi, Michio; Haschek, Wanda M.; Rinehart, Kenneth L.; Carmichael, Wayne W.; Dahlem, Andrew M.; Beasley, Val R.
CS Dep. Vet. Biosci., Univ. Illinois, Urbana, IL, 61801, USA
SO Toxicon (1993), 31(6), 783-9
CODEN: TOXIA6; ISSN: 0041-0101
DT Journal
LA English

REFERENCE 8

AN 118:227626 CA
TI Liquid chromatography-electrospray ionization-mass spectrometry of cyanobacterial toxins
AU Poon, G. K.; Griggs, L. J.; Edwards, C.; Beattie, K. A.; Codd, G. A.
CS Drug Dev. Sect., Cancer Res. Campaign Lab., Inst. Cancer Res., Belmont Sutton Surrey, SM2 5NG, UK
SO Journal of Chromatography (1993), 628(2), 215-33
CODEN: JOCRAM; ISSN: 0021-9673
DT Journal
LA English

REFERENCE 9

AN 116:124498 CA
TI Identification of 12 hepatotoxins from a Homer Lake bloom of the cyanobacteria *Microcystis aeruginosa*, *Microcystis viridis*, and *Microcystis wesenbergii*: nine new microcystins
AU Namikoshi, Michio; Rinehart, Kenneth L.; Sakai, Ryuichi; Stotts, Richard R.; Dahlem, Andrew M.; Beasley, Val R.; Carmichael, Wayne W.; Evans, William R.
CS Roger Adams Lab., Univ. Illinois, Urbana, IL, 61801, USA
SO Journal of Organic Chemistry (1992), 57(3), 866-72
CODEN: JOCEAH; ISSN: 0022-3263
DT Journal
LA English

REFERENCE 10

AN 113:177781 CA
TI Environmental factors affecting the production of peptide toxins in floating scums of the cyanobacterium *Microcystis aeruginosa* in a hypertrophic African reservoir
AU Wicks, Richard J.; Thiel, Pieter G.
CS Div. Water Technol., CSIR, Pretoria, 0001, S. Afr.
SO Environmental Science and Technology (1990), 24(9), 1413-18
CODEN: ESTHAG; ISSN: 0013-936X
DT Journal
LA English

L3 ANSWER 30200 OF 35963 REGISTRY COPYRIGHT 2003 ACS
RN 110592-27-3 REGISTRY
FS PROTEIN SEQUENCE; STEREOSEARCH
SQL 17
NTE modified (modifications unspecified)

type location description

bridge	Cys-5	- Cys-14	disulfide bridge
modification	Trp-15	-	(2-nitrophenyl)thio<Nps>

SEQ 1 DTMRCMVGRV YRPCWEV

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 108:183959 CA
 TI Structure-activity studies on melanin-concentrating hormone
 AU Kawauchi, Hiroshi; Kawazoe, Ichiro
 CS Sch. Fish. Sci., Univ. Kitasato, Iwate, 022-01, Japan
 SO Progress in Clinical and Biological Research (1988), 256(Adv. Pigm. Cell Res.), 517-30
 CODEN: PCBRD2; ISSN: 0361-7742
 DT Journal
 LA English

REFERENCE 2

AN 107:151526 CA
 TI Structure-activity relationships of melanin-concentrating hormone
 AU Kawazoe, Ichiro; Kawauchi, Hiroshi; Hirano, Tetsuya; Naito, Nobuko
 CS Sch. Fisheries Sci., Kitasato Univ., Iwate, Japan
 SO International Journal of Peptide & Protein Research (1987), 29(6), 714-21
 CODEN: IJPPC3; ISSN: 0367-8377
 DT Journal
 LA English

L3 ANSWER 30300 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 108893-81-8 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 14,7,7
 NTE multichain

type	-----	location	-----	description
bridge		Cys-2	- Cys-2'	disulfide bridge, dimer

SEQ 1 GCNSFRY

SEQ 1 GCNSFRY

REFERENCE 1

AN 107:34028 CA
 TI Cardiodilatin, a new peptide hormone
 IN Forssmann, Wolf Georg
 PA Organogen Medizinisch-Molekularbiologische Forschungsgesellschaft m.b.H., Fed. Rep. Ger.
 SO PCT Int. Appl., 35 pp.
 CODEN: PIXXD2
 DT Patent
 LA German
 FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 8502850	A1	19850704	WO 1984-DE279	19841221
	W: JP, US				
	RW: AT, BE, CH, DE, FR, GB, LU, NL, SE				
	DE 3346953	A1	19850814	DE 1983-3346953	19831224

DE 3346953 C2 19930603
 EP 167575 A1 19860115 EP 1985-900447 19841221
 EP 167575 B1 19930526
 EP 167575 B2 19991027
 R: AT, BE, CH, DE, FR, GB, LI, LU, NL, SE
 JP 61500848 T2 19860501 JP 1985-500395 19841221
 JP 08022876 B4 19960306
 AT 89829 E 19930615 AT 1985-900447 19841221
 JP 08022876 B4 19960306 JP 1984-500395 19841221
 US 4751284 A 19880614 US 1985-769627 19850820
 US 4782044 A 19881101 US 1988-140736 19880104
 US 4895932 A 19900123 US 1988-229706 19880808
 JP 07072146 A2 19950317 JP 1994-2150 19940113
 JP 08224094 A2 19960903 JP 1995-260453 19951006
 PRAI DE 1983-3346953 19831224
 EP 1985-900447 19841221
 WO 1984-DE279 19841221
 US 1985-769627 19850820
 US 1987-140736 19871231

L3 ANSWER 30400 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 108318-68-9 REGISTRY
 FS PROTEIN SEQUENCE
 SQL 6
 NTE modified

type	location	description
bridge	Abu-3 - Cys-6	carba sulfide bridge
uncommon	Abu-3 -	-
stereo	Thr-1 -	D

SEQ 1 TAXCHC

REFERENCE 1

AN 113:212645 CA
 TI Synthetic study on peptide antibiotic nisin. IV. Synthesis of ring D-E
 AU Fukase, Koichi; Oda, Yoshiaki; Kubo, Akira; Wakamiya, Tateaki; Shiba, Tetsuo
 CS Fac. Sci., Osaka Univ., Toyonaka, 560, Japan
 SO Bulletin of the Chemical Society of Japan (1990), 63(6), 1758-63
 CODEN: BCSJA8; ISSN: 0009-2673
 DT Journal
 LA English

REFERENCE 2

AN 106:214349 CA
 TI The synthesis of ring D-E in peptide antibiotic nisin
 AU Fukase, Koichi; Oda, Yoshiaki; Wakamiya, Tateaki; Shiba, Tetsuo
 CS Fac. Sci., Osaka Univ., Toyonaka, 560, Japan
 SO Peptide Chemistry (1986), Volume Date 1985, 23rd, 157-62
 CODEN: PECHDP; ISSN: 0388-3698
 DT Journal
 LA English

L3 ANSWER 30500 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 107132-97-8 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 10
 NTE **cyclic**

SEQ 1 ALKLPALKLP

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 121:129753 CA
TI Quantitative Structure-Hydrophobicity and Structure-Activity Relationships
of Antibacterial Gramicidin S Analogs
AU Katayama, Tadashi; Nakao, Kazuya; Akamatsu, Miki; Ueno, Tamio; Fujita,
Toshio
CS Department of Agricultural Chemistry, Kyoto University, Kyoto, 606-01,
Japan
SO Journal of Pharmaceutical Sciences (1994), 83(9), 1357-62
CODEN: JPMSAE; ISSN: 0022-3549
DT Journal
LA English

REFERENCE 2

AN 106:120207 CA
TI Design and synthesis of gramicidin S analogs with high antibiotic activity
AU Sato, Kazuki; Nagai, Ukon
CS Mitsubishi-Kasei Inst. Life Sci., Tokyo, 194, Japan
SO Peptide Chemistry (1986), Volume Date 1985, 23rd, 217-22
CODEN: PECHDP; ISSN: 0388-3698
DT Journal
LA English

L3 ANSWER 30600 OF 35963 REGISTRY COPYRIGHT 2003 ACS
RN 105263-68-1 REGISTRY
FS PROTEIN SEQUENCE; STEREOSEARCH
SQL 7
NTE

type	location	description
bridge	Cys-2 - Cys-7	disulfide bridge

SEQ 1 DCFWKYC

REFERENCE 1

AN 135:24669 CA
TI Urotensin-II analogs for treatment of stroke
IN Dhanak, Dashyant; Knight, Steven D.; Warren, Gregory L.
PA Smithkline Beecham Corporation, USA
SO PCT Int. Appl., 24 pp.
CODEN: PIXXD2
DT Patent
LA English
FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001037780	A2	20010531	WO 2000-US32408	20001129
W: CA, JP, US				
RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR				
EP 1233774	A1	20020828	EP 2000-980842	20001129
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI, CY, TR				
PRAI US 1999-168141P		19991129		
WO 2000-US32408		20001129		

REFERENCE 2

AN 106:150240 CA
 TI Contraction of major artery segments of rat by fish neuropeptide urotensin II
 AU Itoh, Hiroo; Itoh, Yasuko; Rivier, Jean; Lederis, Karl
 CS Fac. Med., Univ. Calgary, Calgary, AB, T2N 4N1, Can.
 SO American Journal of Physiology (1987), 252(2, Pt. 2), R361-R366
 CODEN: AJPHAP; ISSN: 0002-9513
 DT Journal
 LA English

REFERENCE 3

AN 105:206560 CA
 TI Characterization of the biologically and antigenically important regions of urotensin II
 AU McMaster, D.; Kobayashi, Y.; Rivier, J.; Lederis, K.
 CS Dep. Pharmacol. Ther., Univ. Calgary, Calgary, AB, T2N 4N1, Can.
 SO Proceedings of the Western Pharmacology Society (1986), 29, 205-8
 CODEN: PWPSA8; ISSN: 0083-8969
 DT Journal
 LA English

L3 ANSWER 30700 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 104302-63-8 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 8
 NTE **cyclic**
 modified (modifications unspecified)

type	location			description
uncommon	Sar-2	-	-	
uncommon	Sar-4	-	-	
uncommon	Sar-6	-	-	
uncommon	Sar-8	-	-	
modification	Lys-1	-		(phenylmethoxy) carbonyl<Z>
modification	Lys-3	-		(phenylmethoxy) carbonyl<Z>
modification	Lys-5	-		(phenylmethoxy) carbonyl<Z>
modification	Lys-7	-		(phenylmethoxy) carbonyl<Z>

SEQ 1 KKKKKKKX

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 115:108774 CA
 TI Allosteric regulation by calcium dication of hydrophobic pocket constituted by using cyclic peptide as template
 AU Kimura, Shunsaku; Imanishi, Yukio
 CS Dep. Polym. Chem., Kyoto Univ., Kyoto, 606, Japan
 SO Peptide Chemistry (1991), 28th, 183-6
 CODEN: PECHDP; ISSN: 0388-3698
 DT Journal
 LA English

REFERENCE 2

AN 111:111294 CA
 TI Calcium transport through lipid membrane by diastereomer cyclic

octapeptides
 AU Kimura, Shunsaku; Ozeki, Eiichi; Imanishi, Yukio
 CS Dep. Polym. Chem., Kyoto Univ., Kyoto, 606, Japan
 SO Biopolymers (1989), 28(7), 1247-57
 CODEN: BIPMAA; ISSN: 0006-3525
 DT Journal
 LA English

REFERENCE 3

AN 109:124493 CA
 TI Calcium transport through lipid membranes by cyclic octapeptides
 AU Kimura, Shunsaku; Imanishi, Yukio
 CS Dep. Polym. Chem., Kyoto Univ., Kyoto, 606, Japan
 SO Peptide Chemistry (1988), Volume Date 1987 721-4
 CODEN: PECHDP; ISSN: 0388-3698
 DT Journal
 LA English

REFERENCE 4

AN 105:129517 CA
 TI Calcium ion transport through lipid membrane by cyclic octapeptide
 cyclo[-Lys(Z)-Sar-Leu-Sar-Leu-Sar-Leu-Sar-]
 AU Kimura, Shunsaku; Imanishi, Yukio
 CS Dep. Polym. Chem., Kyoto Univ., Kyoto, 606, Japan
 SO Peptide Chemistry (1986), Volume Date 1985, 23rd, 273-6
 CODEN: PECHDP; ISSN: 0388-3698
 DT Journal
 LA English

L3 ANSWER 30800 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 103952-36-9 REGISTRY
 FS PROTEIN SEQUENCE
 SQL 8,4,4
 NTE multichain

type	location	description
bridge	Ala-4 - Ala-4'	covalent bridge, dimer
stereo	Ala-2 -	D
stereo	Ala-4 -	D

SEQ 1 YAF A

SEQ 1 YAF A

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 105:115413 CA
 TI Biologically active peptides and pharmaceutical compositions
 IN DeCastiglione, Roberto; Perseo, Giuseppe; Mena, Renzo; Cervini, Maria
 Antonietta; Rossi, Alessandro
 PA Farmitalia Carlo Erba S.p.A., Italy
 SO Eur. Pat. Appl., 52 pp.
 CODEN: EPXXDW
 DT Patent
 LA English
 FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	----	-----	-----	-----

PI EP 175323 A2 19860326 EP 1985-111688 19850916
 EP 175323 A3 19890208
 EP 175323 B1 19920429
 R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE
 AT 75485 E 19920515 AT 1985-111688 19850916
 JP 61078800 A2 19860422 JP 1985-205492 19850919
 PRAI GB 1984-23771 19840920
 US 1985-745932 19850618
 EP 1985-111688 19850916

L3 ANSWER 30900 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 103290-20-6 REGISTRY
 FS PROTEIN SEQUENCE
 SQL 9
 NTE **cyclic**

type	location	description
uncommon	Orn-5	-
uncommon	Oaa-6	-
uncommon	Orn-9	-

SEQ 1 LFPVXXPVX

****RELATED SEQUENCES AVAILABLE WITH SEQLINK****

REFERENCE 1

AN 105:60927 CA
 TI Synthesis of gramicidin S (GS) analogs, [3-4-.delta.Ava]-GS and [3-4,3'-4'-bis(.delta.Ava)]-GS (.delta.Ava = 5-aminovaleric acid)
 AU Sofuku, Shosuke; Sugiyama, Yasutaro; Muramatsu, Ichiro
 CS Coll. Sci., Rikkyo Univ., Tokyo, 171, Japan
 SO Bulletin of the Chemical Society of Japan (1986), 59(1), 185-90
 CODEN: BCSJA8; ISSN: 0009-2673
 DT Journal
 LA English

L3 ANSWER 31000 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 102255-14-1 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 6
 NTE

type	location	description
bridge	Lys-1 - Glu-6	lactam

SEQ 1 KTIHPE

REFERENCE 1

AN 113:153010 CA
 TI Synthesis and study of cyclic analogs of angiotensin
 AU Ancans, J.; Biseniece, D.; Vosekalna, I.; Myshliakova, N.; Chipens, G.
 CS Inst. Org. Synth., Riga, USSR
 SO Bioorganicheskaya Khimiya (1990), 16(3), 358-69
 CODEN: BIKHD7; ISSN: 0132-3423
 DT Journal
 LA Russian

REFERENCE 2

AN 104:205065 CA
 TI Antigenic activity of angiotensin cycloanalogs
 AU Zalitis, G.; Afanas'eva, G. A.; Ancans, J.; Biseniece, D.; Vegners, R.;
 Cipens, G.
 CS Inst. Org. Sint., Riga, USSR
 SO Latvijas PSR Zinatnu Akademijas Vestis (1986), (2), 87-93
 CODEN: LZAVAL; ISSN: 0023-8929
 DT Journal
 LA Russian

L3 ANSWER 32000 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 88586-15-6 REGISTRY
 FS PROTEIN SEQUENCE
 SQL 14
 NTE modified (modifications unspecified)

type	location	description
bridge	Thr-5 - Asp-14	lactone
uncommon	Orn-7	-
stereo	Phe-1	D
stereo	Ala-9	D
stereo	Ser-12	D

SEQ 1 FWDDTGXDAD GSID

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1

AN 101:38829 CA
 TI Cyclic peptide derivatives
 IN Abbott, Bernard John; Debono, Manuel; Fukuda, David Shuichi
 PA Lilly, Eli, and Co. , USA
 SO Brit. UK Pat. Appl., 64 pp.
 CODEN: BAXXDU
 DT Patent
 LA English
 FAN.CNT 3

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	GB 2120257	A1	19831130	GB 1983-13471	19830516
	GB 2120257	B2	19850605		
	US 4396543	A	19830802	US 1982-380499	19820521
	US 4399067	A	19830816	US 1982-380498	19820521
	ZA 8303451	A	19841224	ZA 1983-3451	19830513
	CA 1200777	A1	19860218	CA 1983-428102	19830513
	CA 1216579	A1	19870113	CA 1983-428101	19830513
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	AT 381103	B	19860825		
	AT 8301785	A	19960815	AT 1983-1785	19830516
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HU 30775	O	19840328	HU 1983-1795	19830520
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 PA Lilly, Eli, and Co. , USA
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	AT 381104	B	19860825		
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	DD 210258	A5	19840606	DD 1983-251130	19830520
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L3 ANSWER 33000 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 77300-54-0 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 9,6,3
 NTE multichain

type	location	description
bridge	Cys-5 - Cys-2'	disulfide bridge

SEQ 1 LYLVCG

SEQ 1 YCN

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 TI Cystine peptides with an insulin-like effect
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 PA Ger. Dem. Rep.
 SO Ger. (East), 12 pp.
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 LA German
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 TI Synthesis of cystine peptides with a primary structure related to the active region of insulin
 AU Losse, Guenter; Stange, Hans; Naumann, Wolfgang
 CS Sekt. Chem., Tech. Univ. Dresden, Dresden, DDR-8027, Ger. Dem. Rep.
 SO Liebigs Annalen der Chemie (1981), (1), 143-51
 CODEN: LACHDL; ISSN: 0170-2041
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 LA German

L3 ANSWER 34000 OF 35963 REGISTRY COPYRIGHT 2003 ACS
 RN 64472-09-9 REGISTRY
 FS PROTEIN SEQUENCE; STEREOSEARCH
 SQL 9,8,1
 NTE multichain
 cyclic,linear
 modified (modifications unspecified)

type	location	description
stereo	Pro-1'	D

SEQ 1 GPGPGPGP

SEQ 1 P

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FS PROTEIN SEQUENCE; STEREOSEARCH
SQL 10
NTE **cyclic**

SEQ 1 AYFPPFFVPP

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CS Anal. Res. Dep., C. H. Boehringer Sohn, Ingelheim, Fed. Rep. Ger.
SO International Journal of Peptide & Protein Research (1980), 15(1), 32-40
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IN Wieland, Theodor; Rietzel, Christian; Birr, Christian
PA Boehringer, C. H., Sohn
SO Ger. Offen., 10 pp. Addn. to Ger. Offen. 2,130,410.
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DT Patent
LA German

FAN.CNT 2

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PRAI	US 1972-261256		19720609		
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DT Patent
LA German

FAN.CNT 2

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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 AU Wieland, Theodor; Rietzel, Christian; Seeliger, Annemarie
 CS Abt. Chem., Max-Planck-Inst. Med. Forsch., Heidelberg, Fed. Rep. Ger.
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